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DATE: July 3, 2000

TO: Governor Gray Davis
Elizabeth G. Hill, Office of the Legislative Analyst
Delaine Eastin, Superintendent of Public Instruction
Members of the State Board of Education
Sue Burr, Interim, Secretary of Education
Senator Dede Alpert, Chair, Senate Education Committee
Assembly Member Kerry Mazzoni, Chair, Assembly Education Committee

FROM: Paul Warren
Deputy Superintendent
Accountability Branch

RE: Legislative Report – Independent Evaluation of the High School Exit Examination

Please find enclosed your copy of the *High School Exit Examination (HSEE): Year 1 Evaluation Report* dated June 30, 2000. The Human Resources Research Organization (HumRRO) was selected through a Request for Proposal (RFP) process to conduct an independent evaluation of the High School Exit Examination (HSEE). The distribution of the report is prescribed in the legislation:

Education Code, Chapter 8, Section 60855 (4) (d) states that the independent evaluator shall provide a preliminary report by July 1, 2000 to the Governor, the Office of the Legislative Analyst, the Superintendent of Public Instruction, the State Board of Education, the Secretary of Education, and the chairs of the education policy committees in both houses of the Legislature.

A one-page summary is attached that describes the report. The full report will be posted on the CDE website this week. The report will be listed under the heading "Independent Evaluation" and the website address will be <http://www.cde.ca.gov/statetests/hsee>.

Questions regarding this report should be directed to Lily Roberts, Consultant, Standards and Assessment Office, (916) 657-3011.

CC: Senator Jack O'Connell
John Mockler, Executive Director, State Board of Education

HIGH SCHOOL EXIT EXAMINATION (HSEE): YEAR 1 EVALUATION REPORT

The Human Resources Research Organization (HumRRO) was selected through a Request for Proposal (RFP) process to conduct an independent evaluation of the High School Exit Examination (HSEE). Education Code, Chapter 8, Section 60855 (4) (d) states that the independent evaluator shall provide a preliminary report by July 1, 2000 to the Governor, the Office of the Legislative Analyst, the Superintendent of Public Instruction, the State Board of Education, the Secretary of Education, and the chairs of the education policy committees in both houses of the Legislature. Subsequent biennial reports will be issued beginning on February 1, 2002. Per the legislation authored by Senator O'Connell (SB 2), the evaluation will analyze data from the field test and annual administrations of the HSEE and report on trends in pupil performance and in pupil retention, graduation, dropout, and college attendance rates. Passing rates and outcome trends will also be analyzed separately for English language learners, students with exceptional needs, students qualifying for free/reduced lunch in Title I schools, and other groups identified by the evaluator as being differentially affected by the exam. The evaluation will also include recommendations for improving the quality, fairness, validity, and reliability of the examination.

This preliminary report is presented in six chapters with an Executive Summary, references and technical appendices. This report describes the evaluation activities through June 2000, summarizes the results of these activities, and offers initial recommendations based on conclusions from these results. Some results from a field test of HSEE questions were not available for this report. A supplemental report will be submitted by August 25th that includes further analyses.

Key findings of the evaluation are:

- ✓ A great deal of progress has been made in developing the HSEE.
- ✓ The results to date are quite positive as indicated by several measures of the quality of the multiple choice test items.
- ✓ Much more needs to be done before operational administration can begin.
- ✓ The results reflect a concern that students are currently not well prepared to pass the exam.

The last finding is of particular concern because a key legal question is: Will students have adequate *opportunity to learn* before taking the HSEE?

The report includes one primary and three specific recommendations related to the development and implementation of the High School Exit Examination. The primary recommendation, based on the last two findings, is:

The State Board of Education, Legislature, and Governor should give serious consideration to postponing full implementation of the HSEE requirement by one or two years.

Preliminary
Evaluation Report
IR-00-27r

June 30, 2000

High School Exit Examination (HSEE): Year 1 Evaluation Report

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High School Exit Examination (HSEE): Year 1 Evaluation Report

Executive Summary

Background

California has embarked on a new program to ensure that all students graduating from high school meet minimum standards for verbal and quantitative skills. The California Education Code, Chapter 8, Section 60850, specifies requirements for the High School Exit Examination (HSEE). Beginning with the Class of 2004, students must pass both the English language arts and mathematics sections of this exam to receive a diploma from a public high school in California. Since January 2000, the California Department of Education (CDE) has worked with a development contractor to develop and try out test questions for use in the HSEE. The current schedule calls for testing 9th graders on a voluntary basis in March and May of 2001 with mandatory testing of all 10th graders (except those passing the exam as 9th graders) in 2002. That will be followed by several additional testing opportunities each year for students who have not yet passed the exam.

The legislation specifying the requirements for the new exam also called for an independent evaluation of the HSEE. CDE awarded a contract for this evaluation to the Human Resources Research Organization (HumRRO). Our evaluation will analyze data from a field test of items (test questions) and the annual administrations of the HSEE and report on trends in pupil performance and pupil retention, graduation, dropout, and college attendance rates. The evaluation will include recommendations for improving the quality, fairness, validity, and reliability of the examination. This report describes evaluation activities through June 2000, summarizes the results of these activities, and offers initial recommendations based on conclusions drawn from these results.

Key Findings and Recommendations

The main conclusions are that a great deal of progress has been made in developing the HSEE and that results to date are quite positive, as indicated by several measures of the quality of the items (test questions). Nonetheless, a great deal remains to be done before the HSEE can be administered operationally. Further, educators surveyed are concerned that students are currently not well prepared to pass the exam. The evidence supporting these conclusions is listed on pages 66–69 in Chapter 6 of this report.

The primary recommendation of this report is based on the evidence that students are not yet well prepared for the HSEE and that many important decisions are needed before the HSEE is ready for operational administration. Our overall recommendation is:

The State Board of Education, Legislature, and Governor should give serious consideration to postponing full implementation of the HSEE requirement by 1 or 2 years.

Three more specific recommendations also are included in this report. First, from discussions with panels of educators, surveys of principals and teachers, and discussions of

the State Board, it is clear that there is confusion about the purposes and nature of California's different high school testing programs. Therefore, our recommendation is:

Specific Recommendation 1. The Department and the Board need to work together to clarify the relationships and differences among the different high school testing programs, most notably the HSEE, the standards-based STAR assessment, and the Golden State Examinations

Results from principal and teacher surveys indicate clearly that much needs to be done at the local level to ensure adequate preparation of all students for the HSEE and appropriate remediation for students who do not initially pass it. Our second recommendation is:

Specific Recommendation 2. The Department and Board should establish, expand, or accelerate processes for communicating with local districts about the HSEE and supporting their preparation for its implementation.

The HSEE Panel has heard several presentations on testing accommodations for special needs students and English-language learners. The availability and appropriateness of such accommodations is an important legal as well as policy issue. More information may be needed to reach informed decisions. Our final specific recommendation is:

Specific Recommendation 3. The Department and the development contractor need to gather, review, and discuss more information on the appropriateness and effectiveness of testing accommodations for special needs students and English-language learners.

More detailed explanations and rationales for each of these recommendations are presented on pages 69–71 of this report. The evaluation activities leading to these conclusions and recommendations are summarized below and described in detail in Chapters 2 through 5 of the report. A brief description of the evaluation plan and Year 1 activities under this plan is presented below, followed by a summary of results as they relate to each of the key evaluation issues.

Summary of Activities and Results Leading to the Findings

Focus of the Evaluation

The focus of the evaluation is on three key aspects of the HSEE:

- **Quality:** Does the exam provide an accurate and unbiased measure of the knowledge and skills specified in the State content standards to be tested by the exam?
- **Fairness:** Do all students have adequate notice of the new requirement, opportunity to learn the material covered by the exam, and opportunity to demonstrate what they have learned?
- **Consequences:** Do benefits from the exam, in terms of improved student achievement and other positive consequences, outweigh any negative consequences?

Year 1 Activities

The main body of this report provides a description of the four different activities conducted during Year 1 of the evaluation. The first activity was a *review* of the experiences of 20 states that have preceded California in developing a high school test. The review, described in Chapter 2, provides information on both *consequences* and *fairness* and goes on to discuss issues and concerns with graduation testing programs.

At the outset of the evaluation, a representative sample of 24 districts in California was identified and recruited to participate in a longitudinal study of the effects of the HSEE. Detailed information on programs and results for these districts will supplement statewide data on the key outcomes. The first use of this sample was to recruit two panels of expert teachers and curriculum specialists to *review test questions* as described in Chapter 3 of this report. The panels examined the *quality* of test items and also provided information on whether all students are provided with instruction in the knowledge and skills necessary to answer the test questions, an issue of *fairness*.

The process for developing and reviewing items (specific test questions) yielded a total of 362 English/language arts items and 396 mathematics items that were included in a field test involving more than 7,500 10th grade students. Chapter 4 of this report describes preliminary results from an independent *analysis of the field test results* by the evaluation contractor, HumRRO. This analysis assesses the *quality* of the test items and, by implication, the item development process. The analysis also examines the potential accuracy of the HSEE scores and potential passing rates for minority and special needs students and for English-language learners, an issue of test *consequences*.

Chapter 5 describes preliminary results from a baseline survey of teachers and principals from the longitudinal study sample. Issues of *fairness*, in terms of student preparation for the examination, and predicted *consequences* were addressed in this survey. Principals and teachers agree that they are more familiar with state content standards than with the HSEE. Some reported that they had no source of information on the HSEE. Principals believe that students and parents are largely unfamiliar with the exam. Some preparatory activities have already begun, most notably alignment of district curriculum content standards with those of the state.

Results

The *quality* of the HSEE was best addressed by the item review workshops and the analyses of data from the field test of the HSEE items. Educators participating in the item review workshops concluded that the items were generally well aligned with the targeted standards. Results from the analyses of field test data showed that nearly all test items passed statistical screens indicating appropriate difficulty, the ability to differentiate high and low performing students, and the absence of differential functioning for minority students. Efforts to examine the potential accuracy of the HSEE scores, while very preliminary, are also reasonably positive. Even given conservative assumptions, the error in test scores is small. Roughly 85% of all 10th graders would receive a score that is clearly (more than one standard error) above or below the minimum passing score. More than 98% of those students would be classified correctly (passed or failed). Decision errors would be greater for the

15% of students whose achievement is within one standard error of the minimum passing score.

Fairness issues were identified in the review of experiences in other states. The court ruling in *Debra P. v. Turlington* (1981) held that all students must be provided instruction in the material covered by the test and that students and parents must be given adequate notice about the test. In a recent case against the Texas Assessment of Academic Skills (*G.I. Forum and Image de Tejas v. Texas Education Agency*, 1997), where the issue was differential impact on minority students due to lower passing rates, the state was required to demonstrate the educational necessity of the exam. Other *fairness* issues include appropriate inclusion and accommodation of students with disabilities and English-language learners. The review suggests that, in implementing a graduation test, a state must establish a structure to support linkages of the exam to instruction at the local level and must attend closely to specific legal requirements.

A key finding on the potential *fairness* of the HSEE was that all students may not have had opportunities to learn the material covered by the test. The item review panels provided an independent assessment of the extent to which students in their districts received sufficient instruction to answer each of the test items correctly. For over half of the mathematics items and more than 90% of the English language arts items, the average ratings across districts suggested that at least one-fourth of the 10th grade students had not received instruction that would allow them to answer the test item correctly. These results provide a baseline assessment of the alignment of district curriculum to the contents of the HSEE, prior to adoption of specific test specifications by the State Board. Similar information will be tracked as the HSEE is implemented, to monitor improvements in the alignment of curriculum to the content of the exam. Findings from the item review workshop were consistent with relatively low expected passing rates found in the teacher and principal surveys. Finally, results from the analyses of field test data showed that the test items are relatively difficult for today's 10th graders, particularly in mathematics. If these items reflect what we believe students need to know and be able to do, and several panels of reviewers believe that they do, then a significant number of 10th grade students are likely to fail this exam. In addition, groups who traditionally score lower on assessments of student achievement will fail at higher rates.

Consequences of the HSEE are more difficult to assess at this point, and this was not a primary focus of Year 1 evaluation activities. The principal and teacher surveys provide some insight into concerns and expectations regarding the examination, although these must necessarily be interpreted with caution at this early juncture given that district personnel are not currently well informed about details of the HSEE. Predictions of the impact of the HSEE on student motivation and parental involvement, prior to the first administration and for those who pass, were neutral-to-mildly positive. For those students who fail on the first attempt, some respondents believe that the impact on student motivation will be quite negative, while others believe it could be positive. The respondents expect instructional practices to improve, over time, as a result of the HSEE, but they anticipate that opportunity to learn material covered by the exam will be lower for English-language learners (ELL) and students with disabilities than for the student population as a whole and that fewer of these students will pass the exam.

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